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Exploration on the Integration of Curriculum Ideological and Political Concept into the Teaching Design of "Culinary Raw Materials": A Case Study of Livestock and Poultry Raw

Materials

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Abstract Comprehensively promoting curriculum ideological and political education is a strategic measure to implement the fundamental task of establishing moral integrity and educating people. Culinary raw materials is the core curriculum of culinary majors, which is rich in ideological and political elements. In this study, taking livestock and poultry raw materials as an example, the teaching design of integrating curriculum ideological and political education into culinary raw materials were investigated by sorting out its teaching contents and excavating its ideological and political elements. Taking livestock and poultry raw materials in *Teochew Cuisine Raw Materials* as an example, the teaching design of curriculum ideological and political education was conducted, aiming to provide some reference and guidance for curriculum ideological and political education of the curriculum.

Key words Culinary raw materials; Livestock and poultry; Curriculum ideological and political education; Ideological and political elements; Teaching design **DOI**:10.19759/j. cnki. 2164 – 4993. 2024. 05. 019

Curriculum ideological and political education is an important strategic measure for schools to implement the fundamental task of establishing moral integrity and educating people, and it is the innovation and sublimation of the educational curriculum concept in the new era^[1-2]. As the core curriculum of current culinary majors, culinary raw materials is a comprehensive curriculum integrating theory, practice and application^[3-5]. At present, in actual teaching, the effect of integrating curriculum ideological and political education into teaching is not obvious, and it is difficult to really play the hidden educational function led by the value of "educating people". Therefore, it is extremely urgent to tap the educational resources contained in the curriculum of culinary raw materials and forge a large number of socialist builders with tenacious will, firm patriotic feelings, excelsior craftsman spirit and firm road confidence, cultural confidence, political confidence and theoretical confidence. In this study, based on the concept of " great ideological and political education", the chapter on livestock and poultry raw materials was selected, and taking the professional knowledge of the overview and types of livestock and poultry raw materials as the main line, a teaching case of integrating ideological and political education into the curriculum was designed to explore its corresponding ideological and political elements and integrate them into various teaching links, so as to achieve the teaching goal of establishing moral integrity and educating people. This study provides reference for the ideological and political construction of culinary raw materials and related curricula^[6-7].

Definition of the Teaching Dimension System of Curriculum Ideological and Political Education in *Culinary Raw Materials*

In order to define the dimension system of ideological and political education in the course of culinary raw materials, this study integrated the specific requirements of "development of Chinese students' core literacy" and the contents of *Guiding Outline of Curriculum Ideological and Political Construction in Colleges and Universities*, and summarized and integrated relevant ideological and political education materials contained in the teaching materials according to the teaching content of cooking materials, so as to implement the fundamental task of establishing moral integrity and educating people and meet the educational requirements of the new era and the core literacy requirements of the discipline [8].

In "development of Chinese students' core literacy", the specific content includes three aspects, six major literacy and 18 basic points^[8]. It was found by analyzing the overall framework of "development of Chinese students' core literacy", the core literacy related to culinary raw materials science includes: humanistic background, scientific spirit, healthy life, responsibility and practical innovation. The specific connotation is shown in Fig. 2.

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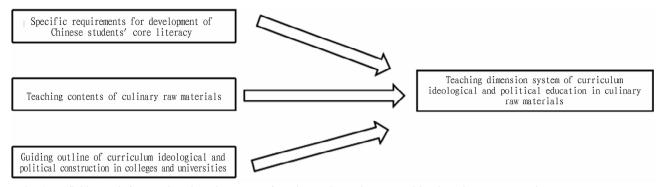


Fig. 1 Definition basis for teaching dimension system of curriculum ideological and political in culinary raw materials

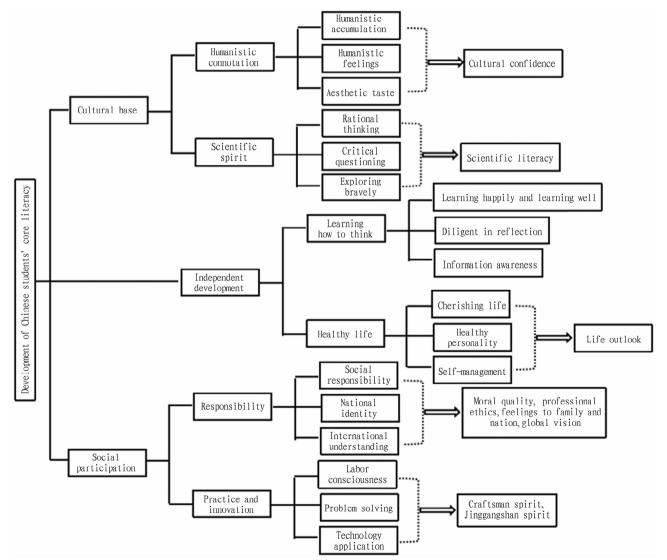


Fig. 2 The responding relationship between "development of Chinese students' core literacy" and culinary raw materials

Excavation of Ideological and Political Elements in the Chapter "Livestock and Poultry Raw Materials"

The teaching content of *Culinary Raw Materials* involved in this paper was based on the textbook *Teochew Cuisine Raw*

Materials. The book consists of eight chapters, including introduction, grain, fruit, livestock and poultry, aquatic products, medicinal and edible materials and auxiliary materials. In this study, we took livestock and poultry raw materials as an example to study the integration of ideological and political education into the teaching design of the curriculum Culinary Raw Materials.

Contents of "livestock and poultry raw materials"

Livestock and poultry raw materials are an important part of Chinese cooking. This chapter is divided into three parts. Firstly, the concept, tissue structure and uses of different parts of livestock and poultry raw materials are summarized, and their application in cooking, quality inspection and storage are emphasized to enhance students' awareness of food safety. Secondly, the quality characteristics, variety distinction and cooking application of several livestock raw materials are introduced in detail, and students' food safety awareness and professional ethics are improved through food safety incidents. Finally, the processing methods and market

situation of livestock and poultry meat products are introduced to lay the foundation for students' professional development.

Curriculum ideological and political elements of "livestock and poultry raw materials"

Livestock and poultry are the main raw materials for meat, which have a long cooking history. The curriculum integrates historical and cultural materials, promotes traditional culture, and stimulates patriotic feelings and self-confidence. Meanwhile, food safety cases are combined to strengthen legal education and enhance students' awareness of the rule of law, so that students can adhere to the bottom line of professional ethics.

Table 2 Ideological and political elements in the chapter on livestock and poultry

Chapter	Content	Ideological and political elements	
Chapter 5: Poultry and	1. Overview of livestock and poultry raw materials	Craftsmanship spirit, cultural confidence	
Livestock	(The development process of cooked food , "Butcher Ding's Dismembering Bulls")		
	2. Types of livestock and poultry raw materials	Craftsmanship spirit, exploration and innovation	
	(Teochew Beef Hotpot, "Dengying beef")		
	3. Livestock and poultry products	Craftsman spirit, professional ethics, dialectical	
	(Production of sausages and braised geese, and the chaos in the food market)	materialism	

Teaching Design of Integrating Ideological and Political Ideas into "Livestock and Poultry Raw Materials"

The teaching design of integrating ideological and political ideas into livestock and poultry raw materials was based on the overview of livestock and poultry raw materials and the professional

Key teaching points and

difficulties in teaching

knowledge of various types. The curriculum ideological and political ideas were integrated into teaching cases, and corresponding ideological and political elements were excavated and integrated into various teaching links. Each case design was displayed in the form of a table, as shown in Table 3.

Design of teaching case 1: Overview of livestock and poultry raw materials

Table 3 Teaching case design of "overview of livestock and poultry raw materials"

Teaching theme	Overview of livestock and poultry raw materials		
Textbook analysis	This lesson is selected from the first section of Chapter 5 of <i>Teochew Cuisine Raw Materials</i> published by Jinan University Press. Chapter 5 mainly talks about livestock and poultry. As an important raw material for daily cooking, livestock and poultry are the basic knowledge that cooking students must master, including the understanding, treatment and preservation of raw materials, and its related knowledge points are numerous and messy. The overview of livestock and poultry raw materials in this section can well sort out the content knowledge of livestock and poultry raw materials, and help to build a complete knowledge system, and provide professional guidance for students in cooking learning. It contains ideological and political elements, which can provide students with ideological and political education.		
Learning situation analysis	After a period of professional study, students have mastered some basic cooking skills and learned more kinds of cooking materials. However, they have not learned much about livestock and poultry raw materials and lack professional knowledge, so they need to deepen their study of relevant knowledge.		
Teaching objectives	① Students get to know the concept and nutritional components of livestock and poultry raw materials, and understand the functions of various tissue structures of livestock and poultry raw materials; ② students should be familiar with the classification of raw materials for livestock and poultry, identify the characteristics of each part, and make the best use of raw materials; ③ students should master the quality inspection and storage methods of livestock and poultry raw materials and improve food safety awareness; and ④ in the aspect of ideological and political education, students are subtly given more ideological and political insights.		
Teaching methods	① Flipped classroom: Before class, the teacher instructs students to do a good job of data collection and preview the contents of this section by watching relevant videos on Superstar Learning Platform; ② multimedia teaching method: the teacher displays the knowledge of livestock and poultry intuitively and vividly through pictures and videos; ③ experimental method: under the guidance of the teacher, students observe and analyze fresh meat; and ④ discussion: in class, students discuss and answer the teacher' questions in groups.		

(1) Key teaching points; Mastering the tissue structure, nutritional components, quality inspection and storage of livestock and poultry

raw materials; 2) difficulties in teaching; classification, identification and treatment of livestock and poultry raw materials.

		Γ)	Table 3)		
		Teach	ing process		
Teaching links	Teaching contents	Teacher's behavior	Teachers' behavior	Design intention	Connecting points with ideological and political education
Prelearning detection (5 min)		The teacher raises questions about the concept of livestock and poultry raw materials to test students' preview results.	learned before class and the	study before class, and summarize common problems for	
Introduction of new lesson (10 min)	components of livestock	The teacher shows relevant pictures of livestock and poultry, and plays videos of livestock breeding in China.	evant pictures and videos,	to stimulate students' interest	cultural confidence, exploration and inno-
Teaching of new lesson (60 min)		Combining multimedia and books, the teacher explains the tissue structure characteristics of livestock meat, and shows the tissue structure models of typical livestock and poultry.	take notes appropriately to mark key points of the book, and observe tissue	students can understand tissue	ideal
	•	The teacher raises following question: How do students usually rough process chickens and ducks	swer: bloodletting-scalding-	their daily life and integrate	
		The teacher raises following question: Have you ever heard of the story of Butcher Ding's Dismembering Bulls, and explains the meaning of the story to students.	tion and sum up their learn-		
		The teacher raises questions about the experiment on sensory inspection indexes of fresh meat, and guides students to analyze the anatomy of meat.		After explaining relevant knowledge, students can intuitively understand the basis of meat inspection through hands-on experiments, which deepens their learning and memory, and consolidates what they have learned.	
		The teacher play videos about storage and preservation of live- stock and poultry meat, and rai- ses following question: How can we store and keep fresh livestock and poultry meat	hands to answer the ques- tion, taking the preservation and storage of domestic live-	their daily life and integrate	
	0 11	The teacher plays videos about the types of cooking techniques through multimedia, and asks: How many dishes are included in the ancient Manchu Han banquet, and What are the most commonly used cooking techniques.	fully, and recall the content		

		(7)	Table 3)		
Teaching links	Teaching contents	Teacher's behavior	Teachers' behavior	Design intention	Connecting points with ideological and political education
Summary after class T and exercise conso- s lidation (15 min)	Cesting of learning re- ults	The teacher guides students to review the knowledge content of this lesson by asking questions.	•		
Extension after class	There are many grown derstand them by the	Exploration and in- novation, patriotism			
Thinking questions and homework	1 ,				Scientific literacy, i- deals and conviction
Teaching reflection	Livestock and poultry raw materials are indispensable raw materials for dishes on people's dining tables. They are closely related to life, while the processing points are also numerous and complicated. Therefore, when teaching the content of this section, the teacher should pay attention to guiding students to think about problems with practice, verify their knowledge with hands-on experiments, and let students know the stories of cooking masters. The lesson achieved efficient teaching with students as the main body and guided students to think positively in combination with life practice. However, due to the lack of teaching time, the knowledge points in this section cannot be fully described, and the teaching time is lacking.				

Design of teaching case 2: Types of livestock and poultry raw materials

Table 4 Teaching case design of "types of livestock and poultry raw materials"

Teaching theme	Types of livestock and poultry raw materials			
Textbook analysis	This lesson is selected from the second section of chapter 5 of <i>Teochew Cuisine Raw Materials</i> science published by Jinan Univers Press. This section is a concrete description of the types of livestock and poultry raw materials, which can help students to know to content knowledge of livestock and poultry raw materials in detail, master the quality characteristics and cooking application of poul and livestock, and provide detailed guidance for students in cooking application.			
Learning situation analysis	After a period of professional study, students have mastered some basic cooking skills and have a general understanding of the knowledge of livestock and poultry. However, the study of livestock and poultry raw materials is still less, and the knowledge is not detail enough, so it is necessary to deepen the study of related knowledge.			
Teaching objectives	①Students should be familiar with the quality characteristics of common livestock and poultry meat and master its cooking application ② they should be familiar with the characteristics of common internal organs and miscellaneous materials of livestock and poultry, are master their cooking application; ③ after understanding the sales situation of livestock and poultry in the market, students can know their own career development and abide by the requirements of food laws and regulations; and ④ in the aspect of ideological and political education, students are taught as many ideological and political elements as possible imperceptibly, so that students can gain movideological and political insights.			
Teaching methods	① Flipped classroom: Before class, the teacher instructs students to do a good job of data collection, and watch relevant videos of Su perstar Learning Platform to preview the contents of this section; ② multimedia teaching method: teachers show the knowledge of live stock and poultry intuitively and vividly through pictures, videos and other forms; ③ divergent association method: students use diver gent thinking and combine their knowledge and experience to analyze the causes of some phenomena; and ④ discussion: in class students discuss and answer questions raised by teachers in groups.			
Key teaching points and	① Key teaching points; Quality characteristics of livestock and poultry meat and its cooking application; ② difficulties in teaching			
difficulties in teaching	Identification of various kinds of livestock and poultry meat.			
	Teaching process			
Teaching link Teach	ching contents Teacher's behavior Teachers' behavior design intention	Connecting points with ideological and political education		
Prelearning detec-Introdu tion (5 min) types livesto		ed		

(Table 4)					
Teaching link	Teaching contents	Teacher's behavior	Teachers' behavior	design intention	Connecting points with ideological and political education
Introduction of new lesson (10 min)		The teacher shows pictures of livestock and poultry, and summarizes the characteristics of common livestock and poultry.	tures and videos and enter	e	Craftsmanship spirit
Teaching of new less son (60 min)	and cooking applica-	The teacher raises following questions: What is the local pig breed here; What are the char- acteristics of meat quality; How can pig breeds be classified	in groups, share their life experiences with each other,	experience, to stimulate their	
		The teacher teaches the identification and harm of brown meat essence.	•	Students should understand the hazards of related drugs and strengthen their profes- sional quality.	
		The teacher asks questions about the practice of "Dengying Beef" in Sichuan, and plays the video, so that students can summarize the techniques.	carefully, the students dis- cuss the techniques used in	skills of Chinese cooking, and their cultural confidence is	
		The teacher asks questions about the different characteristics of different parts of beef, and in- troduces the development of Teochew beef hotpot.	ter thinking, and listen		
		The teacher asks questions about recommended famous dishes of livestock and poultry in students' hometown.	resentative dishes in their		
		The teacher plays the video of yogurt making and explains the principles.		Through popular science, students can understand related research technology of cooking materials, exercise their thinking ability, and their scientific spirit is cultivated.	
		The teacher analyzes fake cattle tripes, and students learn to distinguish true cattle tripes from false cattle tripes.	ences between true tripes	ness of food safety and culti-	
Summary after class and exercise conso- lidation (15 min)		The teacher combs the knowledge points in this section and asks students to complete the exercises after class.	· ·	Through exercises, students can consolidate what they have learned in class.	
Extension after class There are cooking materials for livestock and poultry in Superstar learning platform, and students can watch and understand them by themselves after class.				Exploration and in- novation	
Thinking question	s The teacher raises qu	uestions about the quality character	eristics of livestock and poultr	y raw materials, and asks the	

students to investigate and find out synthetic meat around you and complete the investigation report.

and homework

(Table 4)

Reflection after class

The contents of this section are mainly common types of poultry and livestock, which are closely related to life and have strong application. The teacher pay attention to the expansion of cases and case analysis when teaching this section, so that students can firmly grasp the knowledge of this section and gain ideological and political understanding at the same time. However, due to students' narrow knowledge and biased understanding ability, teachers should explain based on students' characteristics.

Blackboard writing

Overview of livestock and poultry raw materials

- (1) Quality characteristics and cooking application of common livestock meat
- (2) Quality characteristics and cooking application of common poultry meat
- (3) Common livestock viscera and miscellaneous materials

Conclusions and prospects

At present, China's catering industry is booming. In order to meet people's requirements for high quality in the catering industry, the catering industry needs a large number of culinary professionals with craftsmanship spirit and high professional ethics to undertake the task of revitalizing and developing the industry. Therefore, it is very necessary to carry out ideological and political construction in the teaching process of culinary majors. As far as this curriculum is concerned, the ideological and political construction of the curriculum should be considered from many aspects in the subsequent teaching process. Teachers should constantly improve the ability of integrating ideological and political education into cooking teaching, attach importance to the combination of theory and practice of ideological and political elements, stimulate students' enthusiasm, and better realize the goal of talent training.

References

- [1] The Ministry of Education issued Guiding Outline of Curriculum Ideological and Political Construction in Colleges and Universities to comprehensively promote the ideological and political construction in colleges and universities [J]. New Education, 2020, 464(19); 32. (in Chinese).
- [2] YUAN WJ. Study on the collaborative education of "curriculum ideological

and political education" and ideological and political curriculum in colleges and universities $[\ D\]$. Jishou University, 2020. (in Chinese).

- [3] CUI ZK, BI JC, ZHANG LW, et al. Discussion on the teaching of "culinary raw materials" under the background of application-oriented undergraduate education [J]. Agricultural products processing, 2018, 449(3): 72 74. (in Chinese).
- [4] PENG H, YANG WN, CHEN WH, et al. Design and implementation of blended teaching of culinary raw materials course based on superstar learning platform [J]. Journal of Higher Education, 2021, 7 (35): 5. (in Chinese).
- [5] PENG H, QI XW, CHEN WH, et al. Study on the design and application of micro-course group of culinary raw materials [J]. The Processing of Agricultural Products, 2021(23): 4. (in Chinese).
- [6] YANG ZS, QISI KANA, GONG W, et al. Teaching discussion on the integration of ideological and political education into "culinary raw materials" [J]. Yunnan Agriculture, 2022(9): 4. (in Chinese).
- [7] YANG ZS, QISI KANA, SHI ZF, et al. On case teaching design of integrating moral education in "cooking ingredients": Taking "cereal raw materials" as an example [J]. Journal of Sichuan Tourismuniversity, 2023, 164(1): 85-89. (in Chinese).
- [8] Overall framework of "Development of Chinese Students' Core Literacy" was officially released[J]. Shanghai Education, 2016, 992(27): 8-9. (in Chinese).

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- [5] LIU DY, SUN XR, LIU CL, et al. Detection of ash content of wheat flour based on raman spectroscopy combined with simulated annealing [J]. Journal of the Chinese Cereals and Oils Association, 2019, 34(5): 128-133. (in Chinese).
- [6] CHENG JH, CHEN ZG. Wavelength selection method for near infrared spectroscopy based on iteratively retains informative variables and successive projections algorithm [J]. Chinese Journal of Analytical Chemistry, 2021, 49(8): 1402-1409. (in Chinese).
- [7] YAO Y, SHEN XM, QIU Q, et al. Predicting the biochemical methane potential of organic waste with near-infrared reflectance spectroscopy based on GA-SVM [J]. Spectroscopy and Spectral Analysis, 2020, 40 (6): 1857-1861. (in Chinese).
- [8] WANG ZQ, LIU JM, ZENG CH, et al. Rapid detection of protein content in rice based on Raman and near-infrared spectroscopy fusion strategy combined with characteristic wavelength selection [J]. Infrared Physics & Technology, 2023, 129: 104563.

Editor: Yingzhi GUANG

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